

CLAIM AMENDMENTS

This listing of claims will replace all prior versions and listings of claims in the application.

Listing of Claims

1. (Currently Amended) A method of displaying all links connecting a network device with network devices outside a map currently presented on a graphical user interface (GUI) of a communication network, the method comprising:

a) ~~collecting data for all objects to be displayed on said map in response to a request transmitted over said GUI, said request specifying an area of interest in the network;~~

b) ~~bundling all connections between said network device and a group-groups of network devices outside said map into a plurality of outside links, wherein said map corresponds to said area of interest and each outside link represents a group of network devices outside said map an outside link;~~

e) ~~grouping all the plurality of outside links for said network device into a multiple link connector (MLC) object and associating said MLC object with an interactive connector icon;~~

d) ~~displaying said map showing said interactive connector icon attached to said network device; and~~

e) ~~selecting said interactive connector icon for displaying a pop-up window showing a multiple link connector (MLC) list where each outside link object is associated with a respective group-object.~~

2. (Canceled)

3. (Currently Amended) The method of claim 1, wherein:

said multiple link connector list displays in each row an interactive outside link widget associated with a respective interactive group identification widget,

each interactive outside link widget is associated with a respective outside link of said plurality of outside links, and

each interactive group identification widget is associated with a respective group of network devices.

4. (Original) The method of claim 3, further comprising selecting said interactive outside link widget on said multiple link connector list to display a connections list $L(n)$ identifying all connections bundled within said outside link object.

5. (Previously Presented) The method of claim 3, further comprising selecting said respective interactive group identification widget on said multiple link connector list to display a sub-map of said network showing all network devices in said group.

6. (Currently Amended) A system for providing a modified graphical user interface (GUI) adapted to transmit commands and display information with a view to enable management of a communication network, the system comprising:

a map data collector that collects map data for a network device to be displayed on a map of interest;

a multiple link connector (MLC) generator that bundles all-connections between said network device and ~~a-group-groups~~ of outside network devices external to said map into ~~an-a~~ plurality of outside links, and ~~maintaining-maintains~~ a connections list L(n) for each said-outside link;

a list organizer that groups ~~all-said plurality of~~ outside links for said network device into a multiple link connector (MLC) and ~~associating-associates~~ said MLC with an interactive connector icon, wherein said interactive connector icon is displayed on said map attached to said network device; and

an interface that displays a multiple link connector (MLC) list in response to a selection of said interactive connector icon, said MLC list showing an association between each said outside link and a respective group of said-outside network devices.

7. (Canceled)

8. (Previously Presented) The modified GUI of claim 6, wherein each said outside link is displayed using an interactive outside link widget.

9. (Currently Amended) The modified GUI of claim 6, wherein each said group of outside network devices associated with said respective outside link is displayed using an interactive group identification widget.

10. (Original) The modified GUI of claim 8, wherein said list organizer displays said MLC list in response to selection of said interactive outside link widget.

11. (Original) The modified GUI of claim 9, wherein said list organizer displays a sub-map of said group in response to selection of said interactive group identification widget.

12. (Previously Presented) The modified GUI of claim 6, wherein said interactive connector icon is not generated for a single connection.

13. (Currently Amended) A method of using a modified graphical user interface (GUI) adapted to reduce the cluttering of icons on a map of interest, comprising:

a) whenever a network device is connected to ~~more than one outside network device of a group~~ groups of outside network devices external to said map, bundling said groups into a plurality of outside links;

~~displaying an interactive multiple link connector icon, the multiple link connector icon grouping the plurality of outside links into a single icon; and an outside link connecting said network device with said group using an interactive multiple link connector icon; and~~

b) selecting said multiple link connector icon on said map to obtain a multiple link connector list, ~~displaying- that displays~~ an interactive outside link widget associated with an interactive group identification widget for each group of outside network devices connected to said network device.

14. (Previously Presented) The method of claim 13, further comprising selecting said interactive outside link widget for said outside link to obtain a list L(n) with all connections between said network device and said group.

15. (Original) The method of claim 13, further comprising selecting said interactive group identification widget on said multiple link connector list to display a sub-map of all network devices in said group.

16. (Currently Amended) For a GUI of a communication network, a computer-readable media embodying a comprehensive network map illustrating all outside links to a plurality of network devices external to said map, comprising:

a network device icon, illustrating a network device in the context of said map;

an interactive multiple link connector icon associated to said network device, representing all outside links between said network device and all groups of outside network devices connected to the network device, wherein said multiple link connector icon comprises a button for enabling display of a multiple link connector list; and

a pop-up window displaying said multiple link connector list, said multiple link connector list showing an association between each said outside link and a respective group of said outside network devices.

17. (Canceled)

18. (Previously Presented) The computer-readable media of claim 16, wherein each row of said multiple link connector list comprises an outside link widget associated with a group identification widget.

19. (Currently Amended) The computer-readable media of claim 18, further comprising a list with all ~~connection-connections~~ between said network device and said group, the list displayed on said map upon selection of said outside link widget.

20. (Previously Presented) The computer-readable media of claim 18, further comprising a sub-map of said group displayed on said map upon selection of said group identification widget.